

INTERNATIONAL SEARCH REPORT

PCT/GB2004/004607

A. CLASSIFICATION OF SUBJECT MATTER

IPC 7 A62B1/20

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 A62B E06C

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the International search (name of data base and, where practical, search terms used)

EPO-Internal, WPI Data, PAJ

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	PATENT ABSTRACTS OF JAPAN vol. 014, no. 275 (C-0728), 14 June 1990 (1990-06-14) & JP 02 082987 A (TAMEYASU KAWAMORI), 23 March 1990 (1990-03-23) abstract	1-14
Y	US 3 908 791 A (KLEINE ET AL) 30 September 1975 (1975-09-30) the whole document	1-14
Y	US 4 100 996 A (SHARP ET AL) 18 July 1978 (1978-07-18) the whole document	3,9
Y	US 5 224 427 A (RICHES ET AL) 6 July 1993 (1993-07-06) the whole document	10
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☒ Further documents are listed in the continuation of box C.

☒ Patent family members are listed in annex.

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"P" document published prior to the international filing date but later than the priority date claimed

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"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

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"&" document member of the same patent family

Date of the actual completion of the international search

28 January 2005

Date of mailing of the international search report

04/02/2005

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C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 4 791 243 A (IBANEZ ET AL) 13 December 1988 (1988-12-13) the whole document	1-14
A	US 4 399 890 A (BARTELS ET AL) 23 August 1983 (1983-08-23) the whole document	1-14
A	US 3 137 487 A (LESSER FRANK) 16 June 1964 (1964-06-16) the whole document	1-14
A	EP 0 273 673 A1 (BARROW HEPBURN EQUIPMENT LTD; BARROW HEPBURN SALA LIMITED) 6 July 1988 (1988-07-06) the whole document	1-14
A	FR 1 356 533 A (ETABLISSEMENTS WEITZ S. A; LES FILS DE JULES WEITZ, CHANTIERS ET ATELI) 27 March 1964 (1964-03-27) the whole document	1-14

INTERNATIONAL SEARCH REPORT

Information on patent family members

PCT/GB2004/004607

Patent document cited in search report		Publication date	Patent family member(s)	Publication date
JP 02082987	A	23-03-1990	NONE	
US 3908791	A	30-09-1975	CA US	1025413 A1 RE30072 E
				31-01-1978 14-08-1979
US 4100996	A	18-07-1978	NONE	
US 5224427	A	06-07-1993	AT AU AU CA DE DE DK EP ES FI WO GB GR HK JP NO NZ US ZA	115422 T 643293 B2 7885791 A 2063246 A1 69105919 D1 69105919 T2 484494 T3 0484494 A1 2065689 T3 100308 B1 9117795 A1 2244305 A ,B 3015089 T3 194896 A 5500323 T 920237 A ,B, 238211 A 5343975 A 9103842 A
				15-12-1994 11-11-1993 10-12-1991 23-11-1991 26-01-1995 24-05-1995 29-05-1995 13-05-1992 16-02-1995 14-11-1997 28-11-1991 27-11-1991 31-05-1995 01-11-1996 28-01-1993 17-01-1992 26-10-1993 06-09-1994 25-03-1992
US 4791243	A	13-12-1988	NONE	
US 4399890	A	23-08-1983	NONE	
US 3137487	A	16-06-1964	NONE	
EP 0273673	A1	06-07-1988	AU AU CA DE GB JP JP US	603631 B2 8300987 A 1297848 C 3773158 D1 2199880 A ,B 7059253 B 63238882 A 4790410 A
				22-11-1990 23-06-1988 24-03-1992 24-10-1991 20-07-1988 28-06-1995 04-10-1988 13-12-1988
FR 1356533	A	27-03-1964	NONE	